CENTER FOR DISEASE CONTROL

Morbidity and Mortality

Vol. 21, No. 5

Weekly Report

For Week Ending February 5, 1972

U.S. DEPARTMENT OF HEALTH, EDUCATION, AND WELFARE / PUBLIC HEALTH SERVICE HEALTH SERVICES AND MENTAL HEALTH ADMINISTRATION

DATE OF RELEASE: FEBRUARY 11, 1972 – ATLANTA, GEORGIA 30333

EPIDEMIOLOGIC NOTES AND REPORTS

INVESTIGATION OF HOSPITAL USE OF HEXACHLOROPHENE AND NURSERY STAPHYLOCOCCAL INFECTIONS
United States

On Dec. 8, 1971, the Food and Drug Administration (FDA) issued a warning against the use of hexachlorophene-containing preparations for routine total-body bathing of newborn infants. The response to this announcement has been variable; for example, a survey of nurse surveillance officers from 54 hospitals with nurseries indicated that approximately 10% of these hospitals were still bathing newborns with hexachlorophene 6 weeks after the FDA announcement. There has been some confusion about what antiseptic agents to use for handwashing by personnel; the continuing use of hexachlorophene or an iodophor for this purpose was recommended by the FDA.

CONTENTS

On Dec. 31, 1971, CDC received the first report of an outbreak of staphylococcal disease in a nursery where prophylactic hexachlorophene bathing had been replaced by soap and water bathing without other changes in nursery practices. Since then, CDC has received confirmed reports of 24 outbreaks (two or more concurrent cases) with a total of 166

TABLE I. CASES OF SPECIFIED NOTIFIABLE DISEASES: UNITED STATES
(Cumulative totals include revised and delayed reports through previous weeks)

DISEASE	5th WEEK ENDED		MEDIAN 1967-1971	CUMULATIVE, FIRST 5 WEEKS		
	February 5, 1972	February 6, 1971		1972	1971	MEDIAN 1967-1971
Aseptic meningitis	29	52	32	175	317	144
Brucellosis	2	2	2	12	5	7
Chickenpox	3,410	---	---	12,978	---	---
Diphtheria	–	3	3	6	20	12
Encephalitis, primary:						
Arthropod-borne & unspecified	14	19	19	72	105	98
Encephalitis, post-infectious	4	6	7	21	32	34
Hepatitis, serum	183	166	110	904	886	473
Hepatitis, infectious	1,012	1,316	871	5,290	6,315	3,947
Malaria	16	51	57	207	355	243
Measles (rubeola)	820	1,519	883	3,197	6,288	4,474
Meningococcal infections, total	34	53	64	164	281	310
Civilian	34	51	61	157	264	295
Military	–	2	3	7	17	17
Mumps	2,358	3,647	---	10,376	15,341	---
Rubella (German measles)	544	1,029	559	2,268	3,158	2,900
Tetanus	1	1	2	2	3	8
Tuberculosis, new active	602	---	---	2,514	---	---
Tularemia	1	2	2	9	14	9
Typhoid fever	5	8	6	23	29	27
Typhus, tick-borne (Rky. Mt. Spotted fever)	1	1	–	9	2	2
Venereal Diseases:						
Gonorrhea	13,070	---	---	63,248	---	---
Syphilis, primary and secondary	472	---	---	2,079	---	---
Rabies in animals	67	69	66	300	360	352

TABLE II. NOTIFIABLE DISEASES OF LOW FREQUENCY

	Cum.		Cum.
Anthrax:	–	Poliomyelitis, total: Calif.–1	2
Botulism:	–	Paralytic: Calif.–1	2
Congenital rubella syndrome: Calif.–1	1	Psittacosis:* Conn.–1	3
Leprosy: Hawaii–2	8	Rabies in man:	–
Leptospirosis:*Hawaii–1	1	Trichinosis: N.J.–5	13
Plague:	–	Typhus, murine:	3

*Delayed reports: Leptospirosis (1972): Guam–1
Psittacosis (1971): Tex.–1

INVESTIGATION OF HEXACHLOROPHENE – Continued

cases of staphylococcal disease in newborns temporally related to the discontinuation of hexachlorophene bathing (Figure 1). Eight additional outbreaks are also being investigated.

Most cases have had minor skin disease, and no fatalities have been reported. A variety of phage types has generally been found. Most isolates have been resistant to penicillin; resistance to other antibiotics has been found in some cases. No methicillin-resistant strains have been reported. Several hospital nurseries have also reported significant increases in rates of colonization in newborns with coagulase-positive staphylococci following cessation of hexachlorophene bathing.

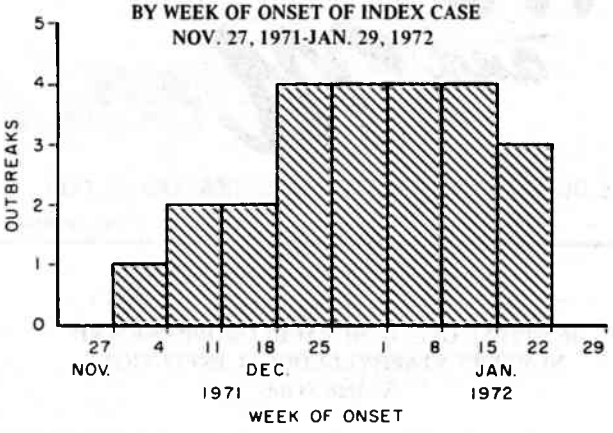
On Jan. 19, 1972, CDC sent letters to each State health department requesting prompt reports of nosocomial outbreaks of staphylococcal disease in newborns. The letter reemphasized the importance of handwashing by personnel between patient contacts to help prevent transmission of staphylococci in nurseries, and it recommended that bathing of newborns with 3% hexachlorophene followed by tap-water rinsing be considered as one of several control measures against a known outbreak of nursery staphylococcal disease.

On February 2, representatives of CDC, the FDA, and the American Academy of Pediatrics met to discuss these developments. After this meeting, the following joint statement was released:

> On Dec. 8, 1971, the FDA and the Committee on the Fetus and Newborn of the American Academy of Pediatrics issued a statement that indicated concern about exposure of newborns to hexachlorophene-containing compounds and advised restrictions in the practice of routinely bathing neonates with hexachlorophene. After this announcement, many hospitals discontinued use of hexachlorophene on newborn infants, and some also curtailed other in-hospital uses, particularly handwashing by hospital personnel. It was specifically recommended that the practice of handwashing with hexachlorophene or an iodophor preparation be continued. From December 31 to February 2, CDC received reports of confirmed outbreaks of staphylococcal disease (defined as two or more concurrent cases) occurring among 23 nurseries that had discontinued prophylactic bathing of newborns with hexachlorophene. Most of the cases investigated have had mild skin infections. Staphylococcal disease is known to occur in hospitals using hexachlorophene. It is also known that many hospitals have discontinued the use of hexachlorophene without the occurrence of staphylococcal disease. Continued study will be necessary to determine the true extent of change in use of hexachlorophene in hospitals or whether reduction in usage by hospitals has been associated with changes in the incidence of infections.
>
> Many hospitals have infection control programs that are successful in preventing transmission of infections caused by *Staphylococcus aureus* in newborns; some of these use prophylactic bathing with hexachlorophene.
>
> There is a firm basis for concern about the indiscriminate or prolonged exposure of humans to hexachlorophene. Total-body washing of newborn monkeys for 90 days with 3% hexachlorophene followed by rinsing resulted in degenerative changes in the white matter of the brains of these animals. Similar brain changes were produced in experimental work with rats. A comparison of the levels of hexachlorophene in the blood of these animals with those found in blood samples from infants bathed with hexachlorophene indicated that toxicity might occur in infants under certain conditions of exposure. Further studies are needed to determine the risk-to-benefit ratio of careful, short-term use of hexachlorophene on newborn infants.
>
> Optimal infection control in nurseries includes the following: uncrowded facilities, infant cohorting, adequate personnel, convenient handwashing facilities, handwashing by personnel with bacteriostatic skin cleansers such as hexachlorophene or iodophors between each infant contact, prompt isolation and treatment of cases, appropriate gowning, and reliable systems for the surveillance of infections. It should be emphasized that the two most important factors in the transmission of infection from infant to infant are hand contact and breaks in technique. If an outbreak of staphylococcal disease occurs in such nurseries, there should be a thorough reevaluation of technique and facilities, and if these are found to be inadequate, corrections should be made. When nursery infection is present, short-term, once-daily prophylactic bathing of newborns with 3% hexachlorophene followed by rinsing should be considered by the physician in charge as part of a total program of control of infections. Hexachlorophene-containing preparations should not routinely be provided for bathing of the infant after leaving the hospital.
>
> Research to evaluate different prophylactic regimens in the prevention and control of nursery staphylococcal infections will be sponsored by the FDA, CDC, and the American Academy of Pediatrics.
>
> Under no circumstances should hexachlorophene bathing of infants be used as a substitute for good hospital practice.

(Reported by the Bacterial Diseases Branch, Epidemiology Program, CDC.)

Figure 1
CONFIRMED OUTBREAKS OF HOSPITAL NURSERY STAPHYLOCOCCAL DISEASE AFTER DISCONTINUATION OF HEXACHLOROPHENE BATHING OF INFANTS, BY WEEK OF ONSET OF INDEX CASE
NOV. 27, 1971-JAN. 29, 1972



Editorial Note

The collective experience of a number of investigators in the last 20 years has provided a large body of evidence that prophylactic bathing of infants with hexachlorophene has been of value in conjunction with other measures in reducing colonization in newborns with *S. aureus* and in preventing clinical disease that may follow colonization. Except for self-limited dermatitis in about 0.1% of newborns, there have been no reports of infant toxicity or other harm produced by normal conditions of use. Further studies are needed to determine whether there are any significant risks of toxicity associated with the careful, short-term use of hexachlorophene on newborn infants.

Data are insufficient at this time to determine the relationship between the discontinuation of hexachlorophene and outbreaks of disease in nurseries. Nontheless, when infection is present in nurseries, short-term, once-daily bathing of hexachlorophene followed by rinsing should be considered as part of a total program for control of infections.

CDC is maintaining close communication with State epidemiologists, is requesting prompt information on outbreaks of staphylococcal disease that occur in hospital nurseries, and is undertaking epidemiologic studies to further establish the relationship between use or non-use of hexachlorophene in bathing infants and the risk of nursery staphylococcal disease.

Selected Bibliography on Hexachlorophene

1. Gezon H, Thompson DJ, Rogers KD, *et al*: Hexachlorophene bathing in early infancy: effect on staphylococcal disease and infection. New Engl J Med 270:379-386, 1964
2. Kimbrough RD: Review of the toxicity of hexachlorophene. Arch Environ Health 23:119-122, 1971
3. Farguharson MB, Perry SF, Barr E: The control of staphylococcal infections in the nursery. Can Med Assoc J 67:247-249, 1952
4. Plueckhahn VD: The staphylococcus and the newborn child. Brit Med J 2:779-785, 1961
5. Williams CPS, Oliver TK, Jr: Nursery routines and staphylococcal colonization of the newborn. Ped 44:640-646, 1969

MALARIA – California

On Jan. 1, 1972, a 19-year-old boy was admitted to a hospital in Los Angeles, California, with a 1-day history of fever and chills. A peripheral blood smear revealed infection with *Plasmodium vivax* parasites. He was treated with 2.5 grams of chloroquine phosphate and discharged on January 6.

The patient admitted to the use of heroin and named seven persons with whom he had shared injection equipment in the previous 30 days. One of these persons was a 21-year-old Vietnam veteran who had returned from Southeast Asia on Oct. 27, 1971. He had been well in Vietnam but did not take his antimalaria medication after his return home. This man became ill with vivax malaria in December 1971. He was admitted to a hospital in Los Angeles, treated with chloroquine and primaquine, and released. He named eight persons with whom he had shared injection equipment.

On Jan. 5, 1972, a 21-year-old woman was admitted to the same hospital as the first patient with a temperature of 106°F. and a 2-day history of shaking chills, headache, and fever. She was found to have vivax malaria on peripheral smear. She admitted to the use of intravenous drugs and was a contact of the above two cases.

The three patients and nine of their contacts were interviewed. Eleven of them were between 18 and 22 years of age; one was 31 years old. Only the veteran had been in Southeast Asia. Four of the contacts had been in Mexico within the past year, and the female patient had been in Panama at the age of 9. She and the veteran said they injected heroin approximately four times a week. The other patient stated that he took heroin approximately once a week. The contacts admitted to between 1 and 5 injections per week. Most of them had last shared equipment with each other on New Year's Eve.

Thick and thin blood smears were obtained from all contacts; serologic specimens were obtained from the contacts and two of the patients. Both patients had positive indirect fluorescent antibody (IFA) titers to *P. vivax* of 1:256; of the nine contacts, one had a positive IFA titer of 1:16. All of the contacts and the veteran were treated with 2.5 grams of chloroquine phosphate. The contacts were cautioned not to share injection equipment with persons who had not been examined for malaria and to take sanitary precautions when they did share.

(Reported by Allen W. Mathies, M.D., head physician, Pediatrics-Communicable Disease, Joshua H. Ritchie, M.D., chief resident, Communicable Disease Service, Los Angeles County-University of Southern California Medical Center; Robert A. Murray, Epidemiology Analyst, Ichiro Kamei, M.D., Chief, Acute Communicable Diseases Control Division, G. A. Heidbreder, M.D., Health Officer, County of Los Angeles Health Department; and an EIS Officer.)

CURRENT TRENDS

TURTLE-ASSOCIATED SALMONELLOSIS CONTROL ORDINANCE – Dade County, Florida

On Jan. 4, 1972, the Metropolitan Board of Commissioners, Dade County, Florida, approved an ordinance to prohibit the sale of salmonella-infected turtles. The Ordinance reads as follows:

> It shall be unlawful for any person to sell, offer for sale, barter or give away live turtles on or after February 1, 1972, except where adequate bacteriological proof is submitted to the Dade County Department of Public Health that such turtles are free from salmonella contamination. Adequate bacteriological proof as used herein shall consist of a statement issued by the chief public health official of the state from which the lot of turtles is shipped, certifying that the turtles have been found free of salmonella based upon laboratory examination, and stating the examinations upon which the statement is based. Such certificates shall accompany and be provided to the dealer of any turtles to be sold from an approved lot. The county director of health may in addition thereto, withhold approval of any lot of turtle[s] whether certified or not, until a series of at least six consecutive cultures [of turtle excreta] taken at intervals of not less than one week have been found negative for salmonella in a laboratory approved for this purpose by the Dade County Department of Public Health. The results of such examinations shall be submitted on a form to be provided by the Dade County Department of

SALMONELLOSIS – Continued

Public Health. The county director of health or his duly authorized representative may at any time take samples of tank water or any other appropriate samples from turtles offered for sale and order the immediate destruction or transshipment of any lot of turtles found contaminated with salmonella[e].

Dade County thus joins the list of areas in the United States to enact such legislation; Washington was the first to do so in 1968 (MMWR, Vol. 20, No. 11).

(Reported by N. Frank, V.M.D., Public Health Veterinarian, Joel L. Nitzkin, M.D., Chief, Office of Consumer Protection, Milton S. Saslaw, M.D., Director, Dade County Department of Public Health; and an EIS Officer.)

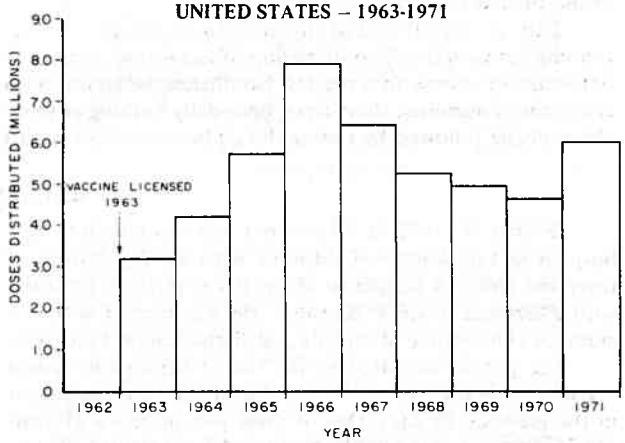
SURVEILLANCE SUMMARY
MEASLES – United States, 1971-72

In the first 16 weeks of the measles epidemiologic year* (EY) 1971-72, 7,006 cases of measles were reported in the United States (Figure 2). This figure represents a decrease of 42% from the 12,069 cases which were recorded for the same period in EY 1970-71, and it approximates the number of cases noted through the first 16 weeks of EY 1969-70.

This decline in the number of cases coincides with a significant increase in the distribution of measles vaccines which was noted by CDC's Biologics Surveillance in the latter months of 1971 (Figure 3). A total of 6 million doses of live measles vaccine were distributed in 1971, the largest amount in any year since 1967 and a 23% increase over the amount distributed in 1970. The decline in cases also correlated with an increase in measles immunity levels from 57.2% in 1970 to 61.0% in 1971 among 1-4 year olds and from 62.8% to 69.7% among 5-9 year olds (1971 United States Immunization Survey). In one large measles outbreak that was investigated in EY 1971-72, the overwhelming majority of cases occurred in unvaccinated children, and vaccine efficacy was found to be 91.5% (MMWR, Vol. 21, No. 2).

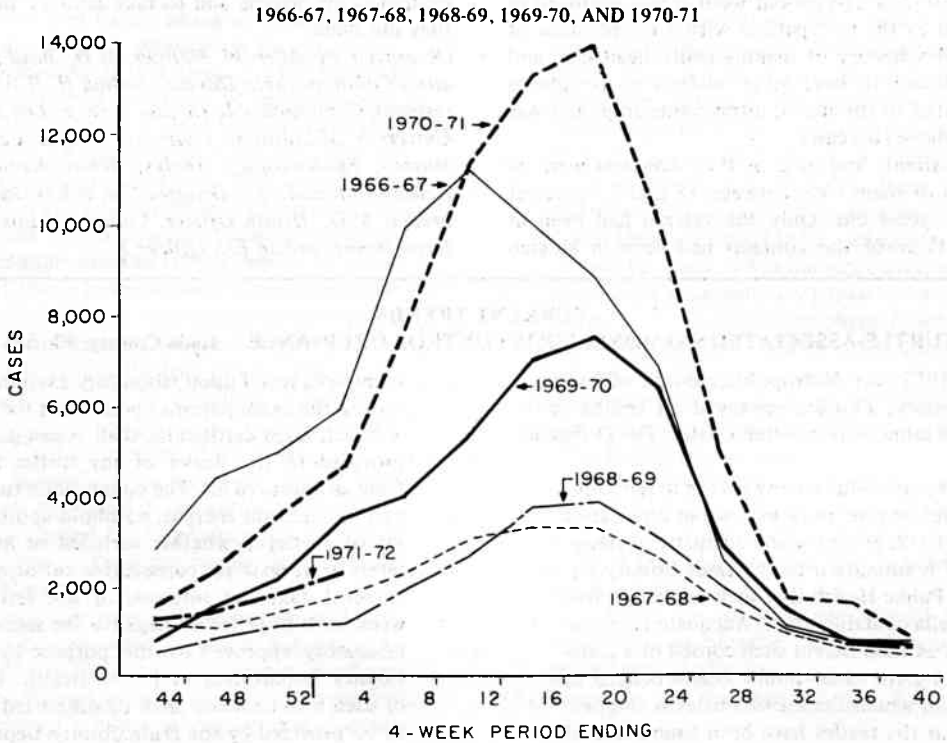
*The measles epidemiologic year begins with the calendar week 41 and ends with week 40 of the following year.

Figure 3
DISTRIBUTION OF LIVE MEASLES-VIRUS VACCINE, BY YEAR
UNITED STATES – 1963-1971



(Reported by the Field Services Branch, Epidemiology Program, and the Immunization Branch, State and Community Services Division, CDC.)

Figure 2
REPORTED CASES OF MEASLES BY 4-WEEK PERIODS, USA,
EPIDEMIOLOGIC YEAR 1971-72 COMPARED WITH
1966-67, 1967-68, 1968-69, 1969-70, AND 1970-71



SUMMARY OF REPORTED CASES OF INFECTIOUS SYPHILIS

CASES OF PRIMARY AND SECONDARY SYPHILIS: By Reporting Areas January 1971 and January 1972 – Provisional Data

Reporting Area	JANUARY		Cumulative JANUARY	
	1972	1971	1972	1971
NEW ENGLAND	63	39	63	39
Maine	1	1	1	1
New Hampshire	–	–	–	–
Vermont	–	–	–	–
Massachusetts	30	20	30	20
Rhode Island	–	–	–	–
Connecticut	32	18	32	18
MIDDLE ATLANTIC	440	541	440	541
Upstate New York	40	44	40	44
New York City	293	377	293	377
Pa. (Excl. Phila.)	14	15	14	15
Philadelphia	23	8	23	8
New Jersey	70	97	70	97
EAST NORTH CENTRAL	239	214	239	214
Ohio	17	40	17	40
Indiana	11	30	11	30
Downstate Illinois	14	10	14	10
Chicago	111	57	111	57
Michigan	84	69	84	69
Wisconsin	2	8	2	8
WEST NORTH CENTRAL	31	45	31	45
Minnesota	1	6	1	6
Iowa	2	–	2	–
Missouri	21	29	21	29
North Dakota	–	–	–	–
South Dakota	–	1	–	1
Nebraska	3	2	3	2
Kansas	4	7	4	7
SOUTH ATLANTIC	499	510	499	510
Delaware	3	3	3	3
Maryland	79	46	79	46
District of Columbia	63	57	63	57
Virginia	29	21	29	21
West Virginia	1	2	1	2
North Carolina	47	43	47	43
South Carolina	51	25	51	25
Georgia	144	153	144	153
Florida	82	160	82	160

Reporting Area	JANUARY		Cumulative JANUARY	
	1972	1971	1972	1971
EAST SOUTH CENTRAL	115	93	115	93
Kentucky	10	28	10	28
Tennessee	70	26	70	26
Alabama	7	11	7	11
Mississippi	28	28	28	28
WEST SOUTH CENTRAL	272	319	272	319
Arkansas	28	24	28	24
Louisiana	68	47	68	47
Oklahoma	7	5	7	5
Texas	169	243	169	243
MOUNTAIN	34	44	34	44
Montana	–	–	–	–
Idaho	1	–	1	–
Wyoming	2	–	2	–
Colorado	2	3	2	3
New Mexico	12	9	12	9
Arizona	13	16	13	16
Utah	–	1	–	1
Nevada	4	15	4	15
PACIFIC	295	236	295	236
Washington	11	11	11	11
Oregon	2	2	2	2
California	279	223	279	223
Alaska	–	–	–	–
Hawaii	3	–	3	–
U.S. TOTAL	1,988	2,041	1,988	2,041
TERRITORIES	65	61	65	61
Puerto Rico	58	60	58	60
Virgin Islands	7	1	7	1

Note: Cumulative Totals include revised and delayed reports through previous months.

CURRENT TRENDS
INFLUENZA – United States, 1972

Reports received by the Viral Diseases Branch, Epidemiology Program, CDC, from state epidemiologists on Feb. 7-8, 1972, indicated that the incidence of influenza is declining in many parts of the eastern and central United States. The disease continued to be reported in scattered parts of the southeastern and western states. Specifically, the number of influenza cases decreased in Illinois, Louisiana, Maryland, Michigan, New York, North Carolina, Texas, and Virginia. No decrease was noted in Alabama, New Mexico, Georgia, and Missouri. The number of cases continued to increase in the Pacific states.

Pneumonia-influenza deaths from 122 United States cities showed a significant decline (of 2 or more weeks) only in the New England states (Figure 4). Total mortality decreased this week, and five regions also showed a 1-week decline: the Middle Atlantic, East North Central, West North Central, Mountain, and Pacific. Recorded deaths continued to increase in the South Atlantic, East South Central, and West South Central. This increase was expected due to the relatively late appearance of influenza in these areas this season. The curves for deaths from all causes were slightly above the epidemic threshold in the first 4 weeks of 1972 (Figure 5).

(Reported by the Viral Diseases Branch, Epidemiology Program, CDC.)

Editorial Note

The MMWR periodically publishes graphic material representing the trends in mortality statistics compiled from 122 United States cities of 100,000 population or greater. This information is an integral part of the surveillance of influenza in the United States.

Excess mortality is a reliable index of the extent and impact of influenza epidemics in the United States. The expected number of deaths and the "epidemic threshold" are derived from the previous 5-year mortality reports, eliminating the effects of influenza epidemics (MMWR, Vol. 14, No. 1). Excess mortality occurs when the number of reported deaths exceeds the "epidemic threshold" for 2 or more consecutive weeks.

Interpretation of the information can only be made in terms of the thresholds, and not absolute numbers.

Figure 4

PNEUMONIA-INFLUENZA DEATHS IN 122 UNITED STATES CITIES

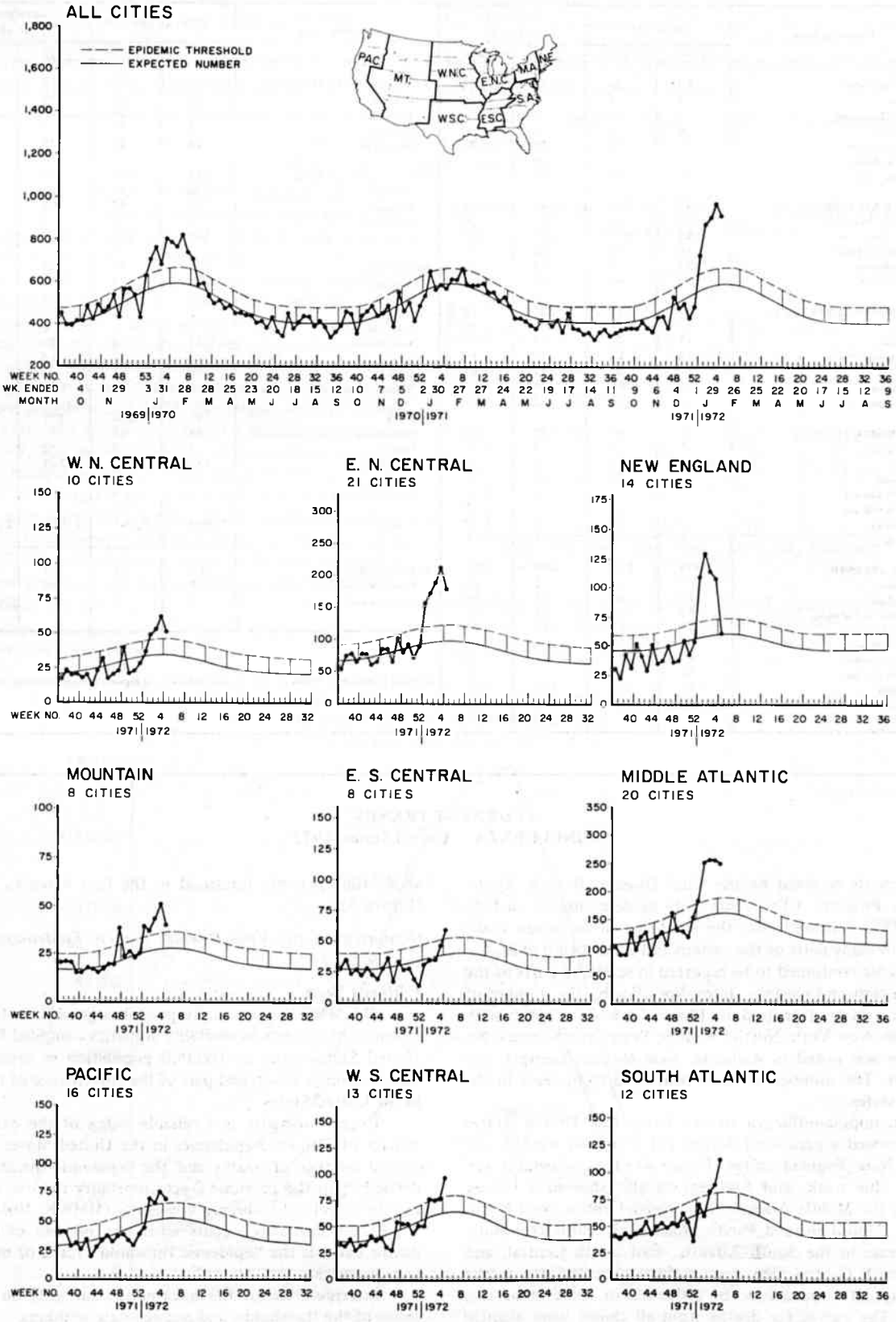


Figure 5
MORTALITY IN 122 UNITED STATES CITIES

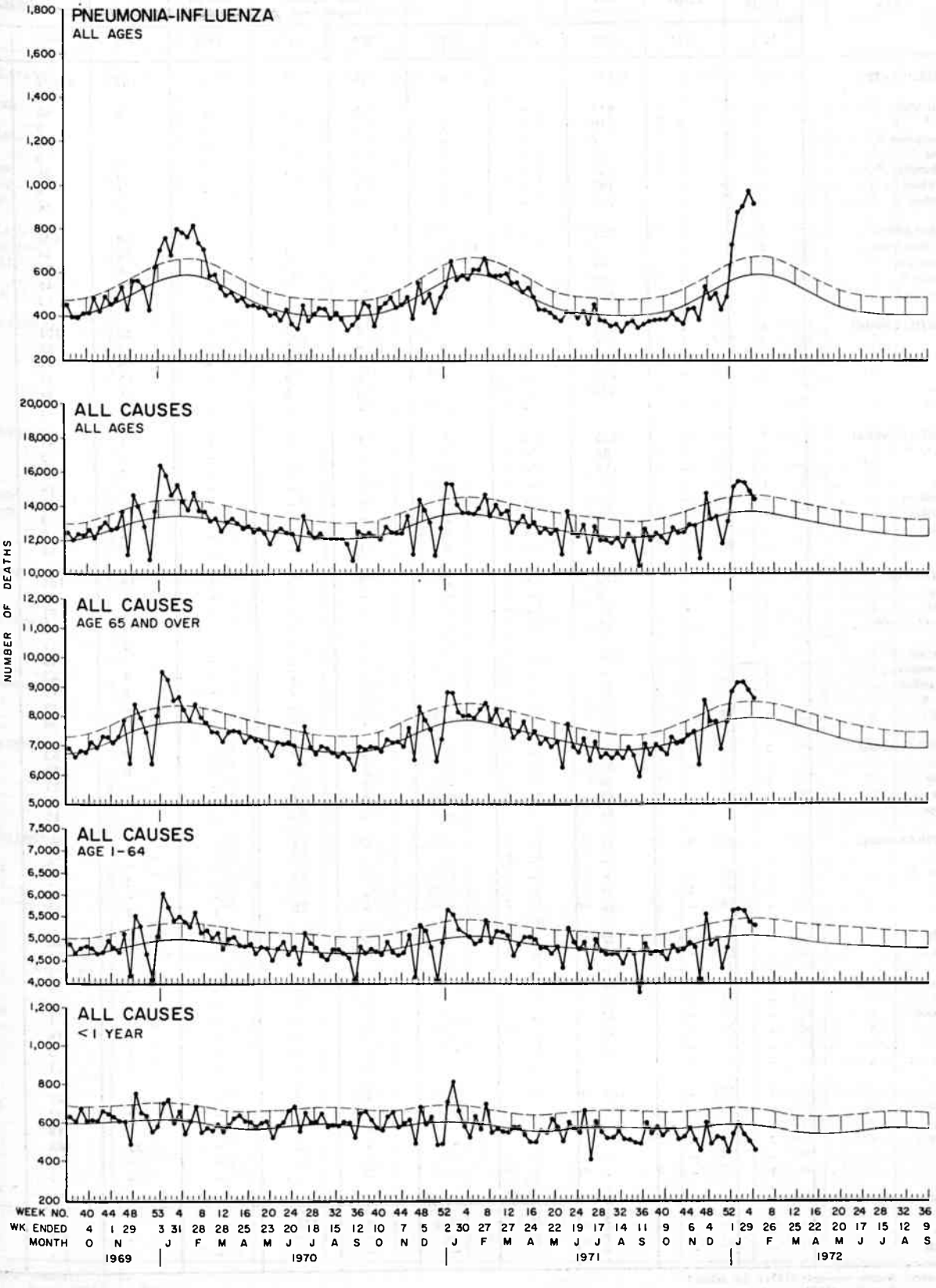


TABLE III. CASES OF SPECIFIED NOTIFIABLE DISEASES: UNITED STATES FOR WEEKS ENDING FEBRUARY 5, 1972 AND FEBRUARY 6, 1971 (5th WEEK)

AREA	ASEPTIC MENINGITIS	BRUCELLOSIS	CHICKENPOX	DIPHTHERIA		ENCEPHALITIS			HEPATITIS		
						Primary including unspec. cases		Post Infectious	Serum	Infectious	
	1972	1972	1972	1972	Cum. 1972	1972	1971	1972	1972	1972	1971
UNITED STATES	29	2	3,410	–	6	14	19	4	183	1,012	1,316
NEW ENGLAND	–	–	611	–	–	1	1	–	6	60	126
Maine *	–	–	10	–	–	–	–	–	–	3	5
New Hampshire *	–	–	2	–	–	–	–	–	–	7	3
Vermont	–	–	25	–	–	–	–	–	–	3	22
Massachusetts *	–	–	186	–	–	–	1	–	3	25	57
Rhode Island	–	–	188	–	–	1	–	–	1	6	16
Connecticut	–	–	200	–	–	–	–	–	2	16	23
MIDDLE ATLANTIC	7	–	224	–	–	–	1	–	68	133	241
Upstate New York	6	–	–	–	–	–	1	–	12	34	41
New York City	–	–	99	–	–	–	–	–	36	38	74
New Jersey *	1	–	NN	–	–	–	–	–	19	48	72
Pennsylvania *	–	–	125	–	–	–	–	–	1	13	54
EAST NORTH CENTRAL	4	1	1,073	–	–	2	7	–	30	151	204
Ohio	2	1	215	–	–	–	2	–	3	29	49
Indiana	–	–	198	–	–	–	–	–	–	12	15
Illinois	2	–	226	–	–	2	2	–	12	31	35
Michigan	–	–	434	–	–	–	3	–	15	74	99
Wisconsin	–	–	–	–	–	–	–	–	–	5	6
WEST NORTH CENTRAL	1	–	558	–	2	1	1	2	3	41	74
Minnesota *	–	–	88	–	–	–	–	–	–	3	24
Iowa	–	–	458	–	–	–	1	–	1	3	8
Missouri	1	–	–	–	–	–	–	–	–	14	15
North Dakota	–	–	–	–	–	–	–	2	–	2	4
South Dakota	–	–	1	–	2	–	–	–	–	3	5
Nebraska	–	–	5	–	–	–	–	–	–	2	4
Kansas	–	–	6	–	–	1	–	–	2	14	14
SOUTH ATLANTIC	7	–	373	–	2	2	5	1	18	163	134
Delaware	–	–	8	–	–	–	–	–	–	2	4
Maryland	1	–	22	–	–	–	–	–	4	21	17
District of Columbia	–	–	15	–	–	–	–	–	2	3	3
Virginia	1	–	9	–	–	–	1	–	2	14	25
West Virginia *	–	–	304	–	–	–	–	–	–	10	14
North Carolina	2	–	–	–	–	–	2	–	4	43	31
South Carolina	1	–	15	–	–	–	2	–	2	13	9
Georgia *	–	–	–	–	–	–	–	–	–	19	7
Florida	2	–	–	–	2	2	–	1	4	38	24
EAST SOUTH CENTRAL	2	–	227	–	1	4	1	–	7	63	86
Kentucky	–	–	195	–	–	–	–	–	6	20	46
Tennessee	2	–	NN	–	–	1	–	–	–	27	34
Alabama	–	–	18	–	1	3	1	–	1	5	2
Mississippi	–	–	14	–	–	–	–	–	–	11	4
WEST SOUTH CENTRAL	–	1	15	–	1	–	1	1	5	110	75
Arkansas	–	–	–	–	–	–	–	–	–	5	2
Louisiana *	–	–	–	–	1	–	1	–	3	7	15
Oklahoma	–	1	1	–	–	–	–	–	–	16	12
Texas	–	–	14	–	–	–	–	1	2	82	46
MOUNTAIN	–	–	132	–	–	–	–	–	5	44	94
Montana	–	–	9	–	–	–	–	–	–	2	5
Idaho	–	–	–	–	–	–	–	–	–	8	22
Wyoming	–	–	13	–	–	–	–	–	–	1	1
Colorado	–	–	27	–	–	–	–	–	–	7	19
New Mexico	–	–	27	–	–	–	–	–	–	1	8
Arizona	–	–	52	–	–	–	–	–	–	19	28
Utah	–	–	4	–	–	–	–	–	5	5	11
Nevada	–	–	–	–	–	–	–	–	–	1	–
PACIFIC	8	–	197	–	–	4	2	–	41	247	282
Washington	–	–	197	–	–	–	–	–	2	37	39
Oregon	–	–	–	–	–	–	–	–	–	18	33
California	7	–	–	–	–	4	2	–	39	184	189
Alaska	–	–	–	–	–	–	–	–	–	1	1
Hawaii	1	–	–	–	–	–	–	–	–	7	20
Guam *	–	–	5	–	–	–	---	–	–	–	---
Puerto Rico	–	–	–	–	–	–	–	–	–	7	8
Virgin Islands	–	–	–	–	–	–	–	–	–	–	–

*Delayed reports: Aseptic meningitis (1971): La. delete 1
Brucellosis (1971): Ga. 1
Chickenpox (1972): Me. 19, Mass. 531, Guam 10
Encephalitis, primary (1971): Pa. 2
Hepatitis, serum: (1971) Pa. 10, N.J. delete 1, (1972) Me. 2, N.J. delete 2, Guam 1
Hepatitis, infectious: (1971) N.H. delete 1, N.J. delete 3, Pa. 41, Minn. 1, W. Va. delete 1

TABLE III. CASES OF SPECIFIED NOTIFIABLE DISEASES: UNITED STATES FOR WEEKS ENDING FEBRUARY 5, 1972 AND FEBRUARY 6, 1971 (5th WEEK) – Continued

AREA	MALARIA		MEASLES (Rubeola)			MENINGOCOCCAL INFECTIONS, TOTAL			MUMPS		RUBELLA	
	1972	Cum. 1972	1972	Cumulative		1972	Cumulative		1972	Cum. 1972	1972	Cum. 1972
				1972	1971		1972	1971				
UNITED STATES	16	207	820	3,197	6,288	34	164	281	2,358	10,376	544	2,268
NEW ENGLAND	1	2	60	145	190	1	4	13	106	419	53	106
Maine*	–	–	39	54	115	–	1	5	16	35	1	4
New Hampshire	–	1	2	6	3	–	–	1	3	15	–	9
Vermont	–	–	4	12	2	–	–	–	6	32	1	2
Massachusetts	–	–	4	8	45	–	–	4	15	82	29	52
Rhode Island	–	–	3	30	19	1	3	1	45	98	4	7
Connecticut	1	1	8	35	6	–	–	2	21	157	18	32
MIDDLE ATLANTIC	1	8	56	287	583	2	11	23	80	497	14	110
Upstate New York	–	–	5	9	68	–	3	4	NN	NN	3	11
New York City	–	–	10	36	343	–	1	2	40	184	4	23
New Jersey	–	6	40	232	39	1	4	4	18	213	4	52
Pennsylvania *	1	2	1	10	133	1	3	13	22	100	3	24
EAST NORTH CENTRAL	4	10	357	1,416	1,166	3	19	31	756	2,901	155	555
Ohio	–	1	18	38	652	–	9	14	177	484	7	41
Indiana	–	–	132	420	10	1	2	1	79	246	35	117
Illinois	2	2	74	351	182	–	1	7	133	541	19	115
Michigan	2	7	54	218	70	1	6	6	75	419	22	126
Wisconsin	–	–	79	389	252	1	1	3	292	1,211	72	156
WEST NORTH CENTRAL	2	7	55	100	277	5	12	27	426	1,965	33	106
Minnesota	–	1	2	3	20	–	–	5	45	172	2	6
Iowa	–	1	49	71	46	–	–	2	301	1,467	16	48
Missouri	–	–	–	15	161	1	2	5	52	81	14	33
North Dakota	–	1	4	8	10	–	–	1	16	112	–	7
South Dakota	–	–	–	1	32	–	1	3	2	10	–	2
Nebraska	–	2	–	2	4	–	2	2	–	57	1	10
Kansas	2	2	–	–	4	4	7	9	10	66	–	–
SOUTH ATLANTIC	2	18	62	344	877	7	41	33	199	950	31	255
Delaware	–	–	–	–	5	–	1	–	2	4	–	1
Maryland	–	–	–	3	8	–	2	6	5	54	5	9
District of Columbia	–	1	–	–	1	1	2	1	–	1	–	–
Virginia	–	1	–	–	449	1	12	1	34	103	2	13
West Virginia	–	1	3	13	38	1	4	1	87	565	11	69
North Carolina	–	6	1	13	222	2	7	5	NN	NN	1	2
South Carolina	2	4	16	45	93	1	7	1	13	54	6	13
Georgia	–	2	1	20	1	–	–	3	–	–	2	5
Florida	–	3	41	250	60	1	6	15	58	169	4	143
EAST SOUTH CENTRAL	–	107	24	178	1,115	1	12	20	146	576	26	148
Kentucky	–	106	4	89	567	–	5	7	31	83	5	62
Tennessee	–	–	1	22	97	–	3	6	93	347	19	65
Alabama	–	1	14	44	322	1	3	4	21	125	1	14
Mississippi	–	–	5	23	129	–	1	3	1	21	1	7
WEST SOUTH CENTRAL	–	17	37	144	1,459	8	22	23	215	874	46	242
Arkansas	–	2	2	3	4	3	3	–	6	12	–	8
Louisiana *	–	–	2	6	203	–	6	9	16	18	–	2
Oklahoma	–	1	–	2	203	–	–	2	6	45	–	1
Texas	–	14	33	133	1,049	5	13	12	187	799	46	231
MOUNTAIN	4	10	72	210	321	–	2	13	134	469	31	100
Montana	–	–	3	4	150	–	–	–	10	46	–	5
Idaho	–	–	2	3	50	–	–	–	4	20	–	3
Wyoming	–	–	–	–	4	–	1	–	2	40	–	–
Colorado	3	8	39	124	26	–	–	3	81	174	21	33
New Mexico	–	1	4	11	53	–	1	–	11	62	2	9
Arizona	1	1	5	45	26	–	–	5	26	126	8	45
Utah	–	–	19	23	12	–	–	4	–	1	–	5
Nevada	–	–	–	–	–	–	–	1	–	–	–	–
PACIFIC	2	28	97	373	300	7	41	98	296	1,725	155	646
Washington	–	–	47	111	68	–	3	3	67	522	32	148
Oregon	–	1	–	7	31	–	1	10	36	255	16	80
California	2	25	45	242	186	7	37	83	171	906	104	406
Alaska	–	–	3	3	3	–	–	–	12	26	–	–
Hawaii	–	2	2	10	12	–	–	2	10	16	3	12
Guam *	–	–	–	–	---	–	–	---	–	–	–	2
Puerto Rico	–	–	6	22	12	–	–	–	15	78	–	–
Virgin Islands	–	–	–	–	2	1	2	–	35	47	–	–

*Delayed reports: Malaria (1971): Pa. 2
Measles (1971): La. delete 1
Mumps (1972): Me. 7
Rubella (1972): Guam 2

TABLE III. CASES OF SPECIFIED NOTIFIABLE DISEASES: UNITED STATES
FOR WEEKS ENDING FEBRUARY 5, 1972 AND FEBRUARY 6, 1971 (5th WEEK) – Continued

AREA	TETANUS	TB (New Active)	TULAREMIA		TYPHOID FEVER		TYPHUS FEVER TICK-BORNE (Rky. Mt. spotted fever)		VENEREAL DISEASES		RABIES IN ANIMALS	
									GONORRHEA	SYPHILIS (Pri. & Sec.)		
	1972	1972	1972	Cum. 1972	1972	Cum. 1972	1972	Cum. 1972	1972	1972	1972	Cum. 1972
UNITED STATES	1	602	1	9	5	23	1	9	13,070	472	67	300
NEW ENGLAND	–	16	–	–	–	1	–	–	317	8	2	12
Maine	–	2	–	–	–	–	–	–	12	1	2	11
New Hampshire	–	–	–	–	–	–	–	–	2	–	–	–
Vermont	–	2	–	–	–	–	–	–	18	–	–	1
Massachusetts *	–	2	–	–	–	1	–	–	143	–	–	–
Rhode Island	–	3	–	–	–	–	–	–	27	1	–	–
Connecticut	–	7	–	–	–	–	–	–	115	6	–	–
MIDDLE ATLANTIC	–	189	–	–	–	1	–	3	2,001	119	1	7
Upstate New York	–	47	–	–	–	1	–	–	318	28	1	4
New York City	–	67	–	–	–	–	–	–	892	60	–	–
New Jersey	–	25	–	–	–	–	–	1	320	13	–	–
Pennsylvania	–	50	–	–	–	–	–	2	471	18	–	3
EAST NORTH CENTRAL	–	80	–	1	–	–	–	–	1,701	31	9	20
Ohio *	–	15	–	1	–	–	–	–	764	10	6	7
Indiana	–	11	–	–	–	–	–	–	114	4	3	5
Illinois	–	10	–	–	–	–	–	–	200	2	–	3
Michigan *	–	36	–	–	–	–	–	–	466	12	–	1
Wisconsin	–	8	–	–	–	–	–	–	157	3	–	4
WEST NORTH CENTRAL	–	22	–	3	–	1	–	1	849	3	12	79
Minnesota *	–	4	–	–	–	–	–	–	151	–	5	23
Iowa	–	2	–	–	–	–	–	–	99	–	4	20
Missouri	–	7	–	3	–	1	–	–	337	2	–	8
North Dakota	–	1	–	–	–	–	–	–	19	–	2	23
South Dakota	–	2	–	–	–	–	–	–	25	–	–	1
Nebraska	–	1	–	–	–	–	–	–	68	–	–	–
Kansas	–	5	–	–	–	–	–	1	150	1	1	4
SOUTH ATLANTIC	–	106	–	1	2	4	1	2	3,372	162	14	32
Delaware	–	2	–	–	–	–	–	–	3	2	–	–
Maryland	–	13	–	–	–	–	–	–	376	19	–	–
District of Columbia	–	13	–	–	–	–	–	–	288	5	–	–
Virginia	–	20	–	1	1	3	1	1	377	58	1	8
West Virginia	–	10	–	–	–	–	–	–	54	–	4	6
North Carolina	–	12	–	–	–	–	–	1	489	14	–	–
South Carolina	–	–	–	–	–	–	–	–	137	6	–	–
Georgia	–	15	–	–	–	–	–	–	831	38	4	12
Florida	–	21	–	–	1	1	–	–	817	20	5	6
EAST SOUTH CENTRAL	–	23	–	1	1	2	–	–	846	36	18	92
Kentucky	–	7	–	–	–	1	–	–	166	3	7	42
Tennessee	–	5	–	–	1	1	–	–	425	8	7	36
Alabama	–	11	–	1	–	–	–	–	55	11	4	14
Mississippi	–	–	–	–	–	–	–	–	200	14	–	–
WEST SOUTH CENTRAL	–	17	1	1	1	2	–	3	1,497	32	10	47
Arkansas	–	15	1	1	1	2	–	–	41	2	–	14
Louisiana	–	–	–	–	–	–	–	–	186	11	2	5
Oklahoma	–	2	–	–	–	–	–	1	238	2	4	12
Texas	–	–	–	–	–	–	–	2	1,032	17	4	16
MOUNTAIN	–	25	–	1	–	3	–	–	493	20	–	4
Montana	–	–	–	–	–	–	–	–	34	–	–	–
Idaho *	–	4	–	–	–	–	–	–	39	–	–	–
Wyoming	–	–	–	–	–	–	–	–	8	–	–	–
Colorado	–	6	–	1	–	–	–	–	94	1	–	–
New Mexico	–	15	–	–	–	1	–	–	145	9	–	–
Arizona	–	–	–	–	–	1	–	–	107	4	–	4
Utah	–	–	–	–	–	1	–	–	31	–	–	–
Nevada	–	–	–	–	–	–	–	–	35	6	–	–
PACIFIC	1	124	–	1	1	9	–	–	1,994	61	1	7
Washington	–	9	–	–	–	–	–	–	147	3	–	–
Oregon	–	9	–	–	–	–	–	–	72	2	–	–
California	1	96	–	–	1	7	–	–	1,706	56	1	7
Alaska	–	–	–	1	–	–	–	–	69	–	–	–
Hawaii	–	10	–	–	–	2	–	–	–	–	–	–
Guam *	–	2	–	–	–	–	–	–	8	–	–	–
Puerto Rico	4	–	–	–	–	–	–	–	–	–	–	10
Virgin Islands	–	–	–	–	–	–	–	–	27	2	–	–

*Delayed reports: Tuberculosis (1972): Mass. 48, Ohio delete 1, Ida. 1, Guam 1
Gonorrhea (1972): Mich. 400, Minn. 100, Ida. 18, Guam 11

Week No. 5

TABLE IV. DEATHS IN 122 UNITED STATES CITIES FOR WEEK ENDING FEBRUARY 5, 1972

(By place of occurrence and week of filing certificate. Excludes fetal deaths)

Area	All Causes			Pneumonia and Influenza	Area	All Causes			Pneumonia and Influenza
	All Ages	65 years and over	Under 1 year	All Ages		All Ages	65 years and over	Under 1 year	All Ages
NEW ENGLAND	783	497	25	61	SOUTH ATLANTIC	1,451	784	58	112
Boston, Mass.	208	123	10	15	Atlanta, Ga.	168	84	11	9
Bridgeport, Conn.	45	26	2	6	Baltimore, Md.	281	164	11	7
Cambridge, Mass.	30	21	–	13	Charlotte, N. C.	64	24	8	–
Fall River, Mass.	41	31	1	2	Jacksonville, Fla.	120	74	1	10
Hartford, Conn.	77	50	3	1	Miami, Fla.	120	65	1	1
Lowell, Mass.	22	14	3	2	Norfolk, Va.	73	37	2	10
Lynn, Mass.	25	19	–	2	Richmond, Va.	131	72	1	21
New Bedford, Mass.	36	24	–	3	Savannah, Ga.	46	23	4	11
New Haven, Conn.	64	34	2	1	St. Petersburg, Fla.	65	56	–	4
Providence, R. I.	78	55	1	2	Tampa, Fla.	89	54	6	20
Somerville, Mass.	9	4	–	–	Washington, D. C.	250	106	11	17
Springfield, Mass.	43	23	–	5	Wilmington, Del.	44	25	2	2
Waterbury, Conn.	34	22	1	–					
Worcester, Mass.	71	51	2	9	EAST SOUTH CENTRAL	772	421	21	59
					Birmingham, Ala.	113	55	4	5
MIDDLE ATLANTIC	3,661	2,244	96	249	Chattanooga, Tenn.	59	32	4	5
Albany, N. Y.	46	27	2	2	Knoxville, Tenn.	63	47	–	2
Allentown, Pa.	23	15	–	5	Louisville, Ky.	187	103	10	30
Buffalo, N. Y.	130	82	2	10	Memphis, Tenn.	165	85	–	7
Camden, N. J.	43	22	1	2	Mobile, Ala.	47	24	–	2
Elizabeth, N. J.	34	23	1	1	Montgomery, Ala.	50	27	2	6
Erie, Pa.	38	25	2	5	Nashville, Tenn.	88	48	1	2
Jersey City, N. J.	72	35	3	1					
Newark, N. J.	75	41	5	11	WEST SOUTH CENTRAL	1,480	825	57	97
New York City, N. Y. †	1,840	1,156	33	124	Austin, Tex.	56	29	1	8
Paterson, N. J.	32	16	1	4	Baton Rouge, La.	59	34	–	3
Philadelphia, Pa.	575	323	32	14	Corpus Christi, Tex.	20	7	2	–
Pittsburgh, Pa.	309	186	9	19	Dallas, Tex.	191	102	9	13
Reading, Pa.	36	27	–	5	El Paso, Tex.	57	35	7	2
Rochester, N. Y.	145	107	1	20	Fort Worth, Tex.	94	54	5	4
Schenectady, N. Y.	29	18	–	2	Houston, Tex.	308	152	6	13
Scranton, Pa.	39	21	–	3	Little Rock, Ark.	49	28	3	–
Syracuse, N. Y.	74	46	3	5	New Orleans, La.	175	93	5	7
Trenton, N. J.	55	30	–	7	Oklahoma City, Okla.	100	57	4	6
Utica, N. Y.	34	25	–	3	San Antonio, Tex.	180	110	8	8
Yonkers, N. Y.	32	19	1	6	Shreveport, La.	81	53	1	7
					Tulsa, Okla.	110	71	6	26
EAST NORTH CENTRAL	2,991	1,799	125	179					
Akron, Ohio	77	42	7	2	MOUNTAIN	497	280	22	40
Canton, Ohio	48	30	–	3	Albuquerque, N. Mex.	40	20	4	5
Chicago, Ill.	808	479	36	37	Colorado Springs, Colo.	30	22	–	9
Cincinnati, Ohio	186	113	8	8	Denver, Colo.	135	89	5	9
Cleveland, Ohio	234	134	11	13	Ogden, Utah	20	13	–	1
Columbus, Ohio	132	83	4	10	Phoenix, Ariz.	143	72	6	11
Dayton, Ohio	118	66	7	4	Pueblo, Colo.	24	8	3	3
Detroit, Mich.	407	238	14	23	Salt Lake City, Utah	40	22	2	–
Evansville, Ind.	43	31	1	5	Tucson, Ariz.	65	34	2	2
Flint, Mich.**	60	34	4	4					
Fort Wayne, Ind.	68	41	1	7	PACIFIC	1,758	1,128	33	69
Gary, Ind.	39	18	2	8	Berkeley, Calif.	13	9	–	–
Grand Rapids, Mich.	52	47	2	8	Fresno, Calif.	55	35	2	1
Indianapolis, Ind.	163	97	4	10	Glendale, Calif.	29	22	–	1
Madison, Wis.	42	21	1	8	Honolulu, Hawaii	63	42	3	4
Milwaukee, Wis.	138	97	1	5	Long Beach, Calif.	132	88	–	5
Peoria, Ill.	67	45	5	5	Los Angeles, Calif.	505	310	11	18
Rockford, Ill.	49	29	5	1	Oakland, Calif.	81	52	2	3
South Bend, Ind.	48	30	2	4	Pasadena, Calif.	36	23	–	1
Toledo, Ohio	157	93	8	13	Portland, Oreg.	159	103	3	3
Youngstown, Ohio	55	31	2	1	Sacramento, Calif.	72	47	2	5
					San Diego, Calif.	149	99	1	6
WEST NORTH CENTRAL	952	607	35	52	San Francisco, Calif.	169	107	1	4
Des Moines, Iowa	60	38	1	5	San Jose, Calif.	42	31	1	1
Duluth, Minn.	38	23	–	1	Seattle, Wash.	160	97	3	11
Kansas City, Kans.	29	17	1	1	Spokane, Wash.	41	30	3	2
Kansas City, Mo.	150	108	2	4	Tacoma, Wash.	52	33	1	4
Lincoln, Nebr.	33	19	1	4					
Minneapolis, Minn.	155	105	5	10	Total	14,345	8,585	472	918
Omaha, Nebr.	88	44	7	3					
St. Louis, Mo.	255	163	11	12	Expected Number	13,549	7,890	589	594
St. Paul, Minn.	76	52	3	1					
Wichita, Kans.	68	38	4	11	Cumulative Total (includes reported corrections for previous weeks)	74,893	44,581	2,695	4,416
Las Vegas, Nev.*	26	11	2	3					

*Mortality data are being collected from Las Vegas, Nev., for possible inclusion in this table, however, for statistical reasons, these data will be listed only and not included in the total, expected number, or cumulative total, until 5 years of data are collected.

†Delayed report for week ended Jan. 29, 1972
**Estimate based on average percent of divisional total

INTERNATIONAL NOTES
QUARANTINE MEASURES

Changes in the "Supplement – Vaccination Certificate Requirements for International Travel," MMWR, Vol. 19, No. 21

The following changes should be made in the Vaccination Certificate Requirements for International Travel:

Canada

Delete all information concerning smallpox, and insert: II > I year.

Smallpox – A certificate is required from passengers (a) who have been in an infected area or an endemic country during the 15 days preceding arrival; (b) who have had possible contact with a case or suspected case of smallpox.

Republic of Korea

Delete all information concerning smallpox, and insert: II.

Romania

In the note concerning cholera, delete: Israel and Lebanon.

Saudi Arabia

Add: As of Feb. 15, 1972: Cholera and yellow fever. II; smallpox, I.

Cholera – And from all countries any parts of which are infected.*

Yellow fever – The countries and territories which were included in the former endemic zones (see p. 28) are considered as infected areas.*

Union of Soviet Socialist Republics

In the note concerning smallpox, insert (after Turkey): United States of America.

Erratum, Vol. 21, No. 4, p. 30

In the article "*Shigella Dysenteriae* Type 1 – California," the three references to the **hemagglutination-inhibition (HI)** test should be changed to **indirect hemagglutination** test.

The Morbidity and Mortality Weekly Report, circulation 28,000, is published by the Center for Disease Control, Atlanta, Ga.

Director, Center for Disease Control — David J. Sencer, M.D.
Director, Epidemiology Program, CDC — Philip S. Brachman, M.D.
Editor, MMWR — Michael B. Gregg, M.D.
Managing Editor — Susan J. Dillon

The data in this report are provisional, based on weekly telegraphs to CDC by state health departments. The reporting week concludes at close of business on Friday; compiled data on a national basis are officially released to the public on the succeeding Friday.

In addition to the established procedures for reporting morbidity and mortality, the editor welcomes accounts of interesting outbreaks or case investigations of current interest to health officials.

Address all correspondence to: Center for Disease Control
Attn: Editor
Morbidity and Mortality Weekly Report
Atlanta, Georgia 30333

DHEW Publication No. (HSM) 72-8017